WO 99/60162

SEQUENCE LISTING

Ali, Shujath

Salceda, Susana

Sun, Yangming

Cafferkey, Robert

<120> A Novel Method of Diagnosing, Monitoring and Staging
Prostate Cancer

```
<130> DEX-0034
```

<140>

<141>

<150> 60/086,265 <151> 1998-05-21

<160> 7

<170> PatentIn Ver. 2.0

<210> 1

<211> 1936

<212> DNA

<213> Homo sapiens

<220>

<221> unsure

<222> (1908)

<400> 1

aatggtatgc caacttaagt atttacaggg tggcccaaat agaacaagat gcactcgctg 60 tgattttaag acaagctgta taaacagaac tccactgcaa gagggn ggc cgggccagga 120 quatetecqe ttqtecauqu caqqqqeeta aggagggtet ceacactqet getagggget 180 gttgcatttt tttattagta gaaagtggaa aggcctcttc tcaactt\tt tcccttgggc 240 tggagaattt agaatcagaa gtttcctgga gttttcaggc tatcatatat actgtatcct 300 gaaaggcaac ataattette etteeeteet tttaaaattt tgtgtteett tttgcagcaa 360 ttactcacta aagggcttca ttttagtcca gatttttagt ctggctgcac ctaacttatg 420 cctcgcttat ttagcccgag atctggtctt ttttntgtnt tttttttntt \tccgtctccc 480 caaagettta tetgtettga etttttaaaa aagtttgggg geagattetg aattgggeta 540 aaagacatgc atttttaaaa ctaggcaact tcttatttct ttcctttaaa aatacatagc 600 attaaatccc aaatcctatt taaagacctg acagcttgag aaggtcacta ctdcatttat 660 aggaccttct ggtggttctg ctgttacgtt tgaagtctga caatccttga gaatcttgc 720 atgcagagga ggtaagaggt attggatttt cacagaggaa gaacacagcg cagaatgaag 780 ggccaggctt actgaggctg tccagtggag ggctcatggg tgggacatgg aaaagaagc 840 agcctaggcc ctggggagcc cagtccactg agcaagcaag ggactgagtg agccttttgc 900 aggaaaaggc taagaaaaag gaaaaccatt ctaaaacaca acaagaaact gtccaaatgc 960

1

<221> unsure <222> (586)



WO 99/60162



```
tttgggaact gtgtttattg cctataatgg gtccccaaaa tgggtaacct agacttcaga 1020
gagaatgagc agagagcaaa ggagaaatct ggctgtcctt ccattttcat tctgttatct 1080
caggtgagct ggtagagggg agacattaga aaaaaatgaa acaacaaaac aattactaat 1140
gaggtacgct gaggcctggg agtctcttga ctccactact taattccgtt tagtgagaaa 1200
cctttcaatt ttctttatt agaagggcca gcttactgtt ggtggcaaaa ttgccaacat 1260
aagttaatag aaagttggcc aatttcaccc cattttctgt ggtttgggct ccacattgca 1320
atgttcaatg ccacgtgctg ctgacaccga ccggagtact agccagcaca aaaggcaggg 1380
tagcctgaat tgctttctgc tctttacatt tcttttaaaa taagcattta gtgctcagtc 1440
cctactgagt actctttctc tcccctcctc tgaatttaat tctttcaact tgcaatttgc 1500
aaggattaca catttcactg tgatgtatat tgtgttgcag ngaaaagaaa aaagtgtctt 1560
tgtttaaaat tacttggttt gtgaatccat cttgcttttt ccccattgga actagtcatt 1620
aacccatctc tgaactggta gaaaaacatc tgaagagcta gtctatcagc atctgacagg 1680
tgaattggat ggttctcaga accatttcac ccagacagcc tgtttctatc ctgtttaata 1740
aattagtttg ggttctctac atgcataaca aaccctgctc caatctgtca cataaaagtc 1800
tgtgacttga agtttagtca gcaccccac caaactttat ttttctatgt gttttttgca 1860
acatatgagt gttttgaaaa taaagtaccc atgtctttat taaaaaanaa aaaaaagggc 1920
                                                                  1936
ggccgccgac tagtga
<210> 2
<211> 637
<212> DNA
<213> Homo sapiens
<400> 2
gtaggggcag acttactgcc ttgaacgaaa gacgatggtc ctcgctcagc ctcactccaa 60
ttatqttcct ctaqqtqqqq caqqtaqqqq gtccaqcttc ctqcttqctq gtqqttcaqq 120
tcatgcgtcc agccttgtcc cttctgacct gggccctacc cacggggaaa tgttcccata 180
gcagaagaat cagccccaca gtgcaggggt gtgttagtgg ggaacgggct ctgggctcct 240
gtgggaacca gggaccccct atcttggtac cggtcattgg atgtatcccc agetcatgcc 300
tgtgtctgtc ttggcccgtg tggtcaccct gtgttcatct ctctcccagc catggcctct 360
caaactgggg ttttcgtctc cctatgaggg ggtcctggta tgtacgcgtt cggtgggccc 420
geggtgeatg teteceggtg cagtgeatge tggggtteee tggggeeetg ggeeeetegt 480
aggatagaca gagcctgtcc taaccttccg gaagtgcatg ctggggaggc cccttgcctg 540
ctgaccttct gtgctcagga cgactaatcg gccacatgac caccactctg tcccatggga 600
                                                                   637
ttcctagaga agtctcacta agagcccagc acactca
<210> 3
<211> 2693
<212> DNA
<213> Homo sapiens.
<220>
<221> unsure
<222> (2266)..(2512)
<220>
```



```
<220>
<221> unsure
<222> (1480)
<220>
<221> unsure
<222> (1532)
<220>
<221> unsure
<222> (1562)..(1566)
<220>
<221> unsure
<222> (1569)
<220>
<221> unsure
<222> (1571)
<220>
<221> unsure
<222> (1631)
<400> 3
gctcctacag ccgcatctgc gttaacatag catccctatg gccactgtct cccttgatcc 60
ccacagccat cctaggagaa aggcagaatg tcataatttg ctaaaaaggga tgctgaggct 120
ctgggaggga aagggacttg cctaaagccc cagggtgaag cagcatctct ggactcccag 180
tocagtgate ttgcccaata ctttgctgct tgcctatace cctctaactt ggtcaacage 240
acatcacagg gcaagcccaa tccctgcttc atttttatat atgggcgctg gtccacagcc 300,
ccactctcca gccatttgga aacaaaaaca gatgctattg ttcttcctta gagaacgtgg 360
ccagtggaga cggcacactg gaaatcagag tgaatgttct tgaaagaggg tcacgggtca 420
acaaggccca gccaaaggat gcagtagaac cattttcctt agaaatcttt gggagtgaag 480
taggetteag ceactaceea tecetgeeet tgeggetace actaceceat tagtttagae 540
agggtcgggc ggggaggggt gtggagaaga aatgagcttg cctgtngccc ccaggctccc 600
tetqteetaq eteaqqtetq qqtqeeatte tttacaeteg tgtgeteget caegeacaca 660
tcacacacct tgctggtcac acagtcacag actcgcctct gctcctgtgg tccagtggcc 720
ggacaccccc tgggatggct caaaggagtc aggacttgga agtggggaca tcagggtagc 780
tgaaggaaat ccacacaccc agagcatctc ggagttcaga ctctcagacc tgaagtaggc 840
gcccccggga ctgggctagg agttggacgg aatggaggat ggaggacagc gagaagaaag 900
gaagagaaat gcaaagtgtg ggcagccgcc aagagtgaaa atagagggaa gtgtcatgca 960
agtgctggac agaaggcggc aggtgggacg agccccacag cccctcctc aaaaacgacc 1020
acctccagga ctcagtgatc cctggggggc aggctctgcc agccctcggc cacacgtggc 1080
tccggcaccc atggtcccag tgccttggat ggagacggcc agttctggcg gccagatgtg 1140
gtgctctgga atccagtccc atttccttcc tggccacgcc tgttccagcg gcctctttgg 1200
ctgcattcag cccctactta cctggggacc ccggctgggg cacaagagca ccaggggggt 1260
agggcccaaa gggatcaggg gaagcctctg gcctggaggg tatggggcac gcttccccaa 1320
```

<222> (52)



```
gggcggaccc ggcaggagga agcccaggag ctgggtcctg ccgcccagga gctgggccct 1380
gccacccagg ccgggctagg gacatggcag ggcctgggca tcctgacgct ggacttgggc 1440
gacctgggag gcacagggag gggagagatg ggcggccccn acccagcgca gtgccggcca 1500
caccccaagg cggttgccag agcttaaggc cnggccccag caggagaaca tcccagctcc 1560
annnnncene neegeageea gtgeteettg teaageteee eeegteacte eaggtgggag 1620
ccacccggt nagggggtgt gccacttgcc cccagggcac tcctctgggc atcccgggtg 1680
ggggattttg gggccgtggg gggcagtctc tggtacctgt gtgcgtcagg gatgctctgc 1740
acctgcaacc aggtgtcgtc cacgggcggg ggcatgggca tggtgacagt ggtcctgttg 1800
atgtcaccga tgatgctgag cgcctccttc agcgcgtggt gcatgtgcag catctcgtcg 1860
tgctgctgtg cctgctctgc caactcctcc atcagtgtgt tctggttccc acatgagtac 1920
atattggcca gcggctccga gatgatgaac tccggggtct gagagtgggc aaacagggaa 1980
gaaggttggg acctggtgcc tgtgccgccc tggctgcctt gctgggccct tctgggactg 2040
tgcgctggac ttggagcccc ttggagtatg gcttttcaca cgggcttcta taccgcttcg 2100
actggaagat ccacctcccc actgcctttt ctcactcaga tggggacacc gaggtccaga 2160
ggaaaagaca cctgtcaaat gtcacagatc tgggagggga cttaagacct atcatgccaa 2220
gaggacacct gtctactcag tttttttttg gtggggggg gggcgnnnnn nnnnnnnnn 2280
agttgatgcc tggatacagg agctctgtgg gtgggagtga gacaaaacac agggtcctga 2580
gctctgggga ccaagcaatg tcctctggtg aaaaaaatcc tggacttgct ggcagaagat 2640
ttgcctctta cttqccatqt qctctgaata catttacctg ccctctggga aaa
<210> 4
<211> 292
<212> DNA
<213> Homo sapiens
<220>
<221> unsure
<222> (284)
<400> 4
aagaatatga gatttgctta gaaatgaagg actggaagga gcccacagag ttattttta 60
aactatccag taaggcttag agggtttcaa tcagaaatat gtgttagggg aaaaaatgca 120
ctttttctat attaaaaaat attattttct tcttttaaat gtaaagcatt cctattgtga 180
agaattgaga aaatacagaa aagtacaaag aaaaacatta cctacaactc caccatccgt 240
                                                         292
gattatcact gttcacattt gtggctcatt tttcagtatk tctnttattt aa
<210> 5
<211> 2694
<212> DNA
<213> Homo sapiens
<220>
<221> unsure
```



- <220>
- <221> unsure
- <222> (74)
- <220>
- <221> unsure
- <222> (76)
- <220>
- <221> unsure
- <222> (80)
- <220>
- <221> unsure
- <222> (92)
- <220>
- <221> unsure
- <222> (97)
- <220>
- <221> unsure
- <222> (123)
- <220>
- <221> unsure
- <222> (132)
- <220>
- <221> unsure
- <222> (173)
- <220>
- <221> unsure
- <222> (217)
- <220>
- <221> unsure
- <222> (257)
- <220>
- <221> unsure
- <222> (2539)
- <400> 5

tactatattg ctcagcattt ctaagtattc tctaagtgct ctttatttat gntttaaaat 60 agctctctta cccngntgcg ncgactagaa gancttgntt taggaaacaa tgaaatatat 120





aanttgccag	antcaattgg	agccctctta	catctaaaag	atctctggtt	ggntggaaat	180
					tttagatgtc	
tctgaaaaca	ggttggnaag	acttcctgaa	gaaatcagtg	gcctgacttc	attaacggat	300
ttagtcattt	cccagaactt	attagaaacg	attccggatg	gcattggaaa	actaaagaaa	360
ctgtcaatct	tgaaggtgga	tcagaataga	ctcacacagt	tgcctgaagc	agttggggaa	420
tgtgaaagtc	tcactgagtt	agttcttaca	gaaaatcagc	tcctgaccct	gcctaaaagc	480
attggaaaac	taaagaagtt	gagcaacttg	aatgcagaca	gaaataaatt	agtgtcctta	540
ccaaaagaga	tcggcgggtg	ctgcagcctc	actgtgttct	gtgtacgtga	caacagacta	600
actcggatac	ctgcagaggt	gtcacaggca	acagaacttc	atgtcctgga	tgtggcaggg	660
aacaggttgc	tgcatctacc	tttatccctg	actgccttga	agttgaaggc	tctgtggcta	720
					caccacagga	
gagaagattt	taacctgtgt	cttacttcct	cagctgcctt	ctgaacctac	ttgtcaagag	840
aatctgcctc	gctgtggtgc	actggagaac	ttggtaaatg	atgtctctga	tgaagcctgg	900
aacgagcgtg	ctgtcaacag	agtcagtgcg	atccgatttg	tggaggatga	gaaagatgaa	960
gaagacaatg	agacgagaac	acttctaagg	cgagccactc	cacacccagg	ggagttaaag	1020
cacatgaaaa	agacagtgga	gaatttacgg	aatgacatga	atgctgctaa	aggactggac	1080
tcaaacaaaa	acgaggtcaa	tcatgccatt	gaccgagtga	ccacttctgt	gtagagtttc	1140
					tctgcttccc	
gggagcctca	cgtgctcctt	gtcctaacca	gcccccgcgc	gccatcttcc	cgtggagtgt	1260
					agcgcaccag	
					agtagaatac	
					aagcaggaag	
					ccccaagttc	
					ctttttaaac	
					tcataacaaa	
					gtatttgtgc	
					ccttactgta	
					gatgagaata	
					gtggatttgt	
					tttttttgaa	
					ttctgaataa	
					gccatttgta	
					cagtgggcaa	
					gttttatatc	
					gttgctatct	
					aatactgctt	
					ggtgtgtttc	
					gtcactgtgt	
					ctggacattg	
					tagccaaatt	
					tgagtgacct	
					ctggctagta	
attttgggtt	gtggctatct	ggccaattgg	actccttata	aacccgtctt	caac	2694

<210> 6

<211> 1335

<212> DNA

<213> Homo sapiens



WO 99/60162



```
<220>
<221> unsure
<222> (17)
<400> 6
tcatatagta ggaaganaag cacctaggtt tgaggccagg gctggctgct gtcagaacct 60
aggccctccc ctgccttgct ccacacctgg tcaggggaga gaggggagga aagccaaggg 120
aagggaccta actgaaaaca aacaagctgg gagaagcagg aatctgcgct cgggttccgc 180
agatgcagag gttgaggtgg ctgcgggact ggaagtcatc gggcagaggt ctcacagcag 240
ccaaggaacc tggggcccgc tcctccccc tccaggccat gaggattctg cagttaatcc 300
tgcttgctct ggcaacaggg cttgtagggg gagagaccag gatcatcaag gggttcgagt 360
gcaageetea eteccageee tggcaggeag eeetgttega gaagaegegg etactetgtg 420
gggcgacgct catcgcccc agatggctcc tgacagcagc ccactgcctc aagccgtggc 480
cgctacatag ttcacctggg gcagcacaac ctccagaagg aggagggctg tgagcagacc 540
cggacagcca ctgagtcctt ccccaccc ggcttcaaca acagcctccc caacaaagac 600
caccgcaatg acatcatgct ggtgaagatg gcatcgccag tctccatcac ctgggctgtg 660
cgacccctca ccctctcctc acgctgtgtc actgctggca ccagctgcct catttccggc 720
tggggcagca cgtccagccc ccagttacgc ctgcctcaca ccttgcgatg cgccaacatc 780
accatcattg agcaccagaa gtgtgagaac gcctaccccg gcaacatcac agacaccatg 840
gtgtgtgcca gcgtgcagga agggggcaag gactcctgcc agggtgactc cgggggccct 900
ctggtctgta accagtctct tcaaggcatt atctcctggg gccaggatcc gtgtgcgatc 960
acccgaaagc ctggtgtcta cacgaaagtc tgcaaatatg tggactggat ccaggagacg 1020
atgaagaaca attagactgg acccacccac cacagcccat caccctccat ttccacttgg 1080
tgtttggttc ctgttcactc tgttaataag aaaccctaag ccaagaccct ctacgaacat 1140
tetttgggcc teetggacta caggagatgc tgtcacttaa taatcaacct ggggttcgaa 1200
atcagtgaga cctggattca aattctgcct tgaaatattg tgactctggg aatgacaaca 1260
cctggtttgt tctctgttgt atccccagcc ccaaagacag ctcctgccat atatcaagtt 1320
                                                                   1335
tcaataaata tttct
<210> 7
<211> 1079
<212> DNA
<213> Homo sapiens
<220>
<221> unsure
<222> (268)
<220>
<221> unsure
<222> (688)
 <220>
 <221> unsure
 <222> (700)
<400> 7
```





						60
tttttgaaga	atgccctgca	aggcatcaac	tggaatgtgt	ttattaccaa	acaagacaga	60
agagaaccag	ggcctgactt	ggcagtggcc	ccaggctgca	tgggctcagg	taggctcaga	120
ccggccccag	gagtgggaga	gcccagagaa	gagggaaaaa	gagtagtggc	caggaggggt	180
ctggctggga	catgccactc	tgggccatca	gcttctggat	ccactcaaag	tggtggctga	240
tattggtgta	gacaccgggc	cgattggncc	gaccacagcc	cactccccag	ctcacgactc	300
caatctgata	ccacagtcca	ttcttgttac	aggccaaggg	tccacctgag	tcaccgaagc	360
aggcatcctt	cccgccttgg	gcattgccag	cacaaaccat	gtctccaaag	atgtccttgc	420
	cttgaggaag					
	ggtgtgggga					
	gtctgtccgg					
	agtgtaggtg					
	ttagcgaggg					720
	ccagaaggat					780
	aaggtcacta					840
	gctcactccg					900
	gagttcggcg					960
	tgataagggc					1020
	cgccagcagc					1079